

GenCore version 4.5
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OM nucleic - nucleic search, using sw model

Run on: June 6, 2001, 18:42:29 ; Search time 3825.23 Seconds
(without alignments)
8767.220 Million cell updates/sec

Title: US-09-494-297-1
Perfect score: 2274
Sequence: 1 atgataaaaagaagtttcc.....ggataagaaaacatgactag 2274

Scoring table: IDENTITY_NUC
Gapop 10.0 , Gapext 1.0

Searched: 1283235 seqs, 7373929652 residues
Total number of hits satisfying chosen parameters: 2566470

Minimum DB seq length: 0
Maximum DB seq length: 200000000

Post-processing: Minimum Match 08
Maximum Match 1008
Listing first 45 summaries

Database :

GenEmbl:*

- 1: gb_ba1:*
- 2: gb_ba2:*
- 3: gb_ba3:*
- 4: gb_in1:*
- 5: gb_in2:*
- 6: gb_in3:*
- 7: gb_om:*
- 8: gb_ov:*
- 9: gb_pat1:*
- 10: gb_pat2:*
- 11: gb_ph:*
- 12: gb_pl1:*
- 13: gb_pl2:*
- 14: gb_pl3:*
- 15: gb_pl4:*
- 16: em_ba1:*
- 17: em_ba2:*
- 18: em_fun:*
- 19: em_htgo_hum:*
- 20: em_htgo_inv:*
- 21: em_htgo_rod:*
- 22: em_htg_hum1:*
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- 28: em_htg_hum7:*
- 29: em_htg_hum8:*
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- 31: em_htg_inv2:*
- 32: em_htg_other:*
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- 38: em_hum5:*
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- 40: em_hum7:*
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- 42: em_om:*
- 43: em_or:*

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51: em_un:*

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53: gb_sts1:*

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58: gb_v1:*

59: gb_v12:*

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79: gb_htg20:*

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81: gb_htg22:*

82: gb_htg23:*

83: gb_htg24:*

84: gb_htg25:*

85: gb_pr1:*

86: gb_pr2:*

87: gb_pr3:*

88: gb_pr4:*

89: gb_pr5:*

90: gb_pr6:*

91: gb_pr7:*

92: gb_pr8:*

93: gb_pr9:*

94: gb_rol:*

95: gb_rol2:*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

Result No.	Score	Query Match	Length	DB ID	Description
c 1	720.8	31.7	10826	3	SPU49397
2	215.8	9.5	2845	3	STREPTINF
3	180.2	7.9	2263	3	SPSFB
4	167.6	7.4	2066	2	GU31115
5	150.2	6.6	2801	1	AF009908
6	97	4.3	321	1	AF009914
7	92.8	4.1	313	1	AF009913
8	72	3.2	348	1	AF009920
9	69.8	3.1	149789	60	AC007926
10	68.4	3.0	309	1	AF009915
11	68.2	3.0	278	1	AF009917

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12 68.2 3.0 195969 76 AC074354
13 67.6 3.0 281 1 AF009909
14 67.6 3.0 282 1 AF009912
15 66.8 2.9 310 1 AF009910
16 64.2 2.8 326 1 AF009910
17 64.2 2.8 2842 5 AF103869
18 61.6 2.7 309 1 AF009918
19 61.4 2.7 255 1 AF009916
20 60.2 2.6 6941 6 ENHMHGAX
21 59.4 2.6 256172 60 AC005139
22 59.4 2.6 310779 60 AC005140
23 59 2.6 83110 84 PFMAL13PB
24 58.8 2.6 4102 5 AF270648
25 58.6 2.6 308 1 AF009919
26 58.6 2.6 879 53 CNS01JRG
27 58.6 2.6 1007 53 CNS06X9S
28 57.4 2.5 131184 92 HSH2137
29 57.4 2.5 340000 36 HSH21C017
30 57.4 2.5 340000 90 AF001672
31 56.6 2.5 12240 4 AE001424
32 56.6 2.5 232392 58 AF250284
33 56.4 2.5 321003 84 PFMALAP3
34 56 2.5 17470 4 AE001402
35 55.8 2.5 1137 53 CNS071NS
36 55.4 2.4 694 6 S52459
37 55.2 2.4 897 54 CNS07ABZ
38 55.2 2.4 3711 5 AF247634
39 54.6 2.4 964 54 CNS07E8R
40 54.4 2.4 759 53 CNS06QXV
41 54.4 2.4 174832 83 CNS01RGQ
42 53.8 2.4 9432 4 AE001375
43 53.6 2.4 110000 84 PFMAL13P2_0
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45 53.6 2.4 204652 84 PFMAL13P6

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ALIGNMENTS

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DEFINITION Streptococcus pyogenes Msmr (msmr) gene, partial cds; Lepa (lepa),
partial cds; and Nra (nra) genes, complete cds; Ssba (ssba) gene,
partial cds; and unknown genes.
ACCESSION U49397
VERSION U49397.1 GI:4028947
KEYWORDS
SOURCE Streptococcus pyogenes.
ORGANISM Streptococcus pyogenes
Bacteria; Firmicutes; Bacillus/Clostridium group; Streptococcaceae;
Streptococcus.
REFERENCE 1 (bases 1 to 10826)
AUTHORS Podbielski,A., Woloschnik,M., Leonard,B.A.B. and Schmidt,K.H.
TITLE Characterization of nra, a global negative regulator gene in group
A streptococci
JOURNAL Mol. Microbiol. 31 (1999) In press
REFERENCE 2 (bases 1 to 10826)
AUTHORS Podbielski,A. and Woloschnik,M.
TITLE Direct Submissio
JOURNAL Submitted (19-FEB-1996) RWTH Aachen, Institute of Medical
Microbiology, Pauwelsstrasse 30, Aachen, Nrw, Federal Republic of
Germany, 52074
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Best Local Similarity 57.2%; Pred. No. 6,7e-26;
Matches 466; Conservative 0; Mismatches 322; Indels 27; Gaps 3;
QY 51 ggtttaagtaaaactcaaaagattactgtcacttagtgagagctctttaatgat 110
DB 487 GGCAACACACAAAGAAAGGCAATTTGCTGCTCACTTGTAGTGGAGCTTTTATGCT 546
QY 111 ctctgcttgtaactccatgctgtgtgctgaagctgttttgtagtagatcctc 170
DB 547 TTTGGCATGCGCGGCTGCTATCGTTTGGTCAAGTACCTATCTGCCGTGGAAGAC 606
QY 171 gacgcacaaacgaataatccaagttcgaatcgaatagatgtagatgtagatc 230
DB 607 TGTGCGGAGTCATGATGATGATGATGATGATGATGATGATGATGATGATGATG 660
QY 231 ttatgtaagagagcattccatataataacagttagagtagacagattaaaggt 290
DB 661 TTATGTAAGAGAAATATCTGATATATATATATATATATATATATATATATAT 720
QY 291 cttagaaggaagtagaagtagaagtagaagtagaagtagaagtagaagtagaag 350
DB 721 TTTAAAGGAGAGTGGAGCTACCAAGTTATGTTTAAATTTAAATTTAAATTTAA 780
QY 351 cgaatcagatagtagtctaaagaatgtagaagtagaagtagaagtagaagtaga 410
DB 781 CCAAAATAATGTTTAAATAAATAATGTTTAAATAAATAATGAGGAATAATGCAAT 840
QY 411 tgaagtagatgtagagcccttagaataacaggaatgtagaagtagaagtaga 470
DB 841 TGTAGATATGCTACACTATAAAGTAAGTAAGTAAGTAAGTAAGTAAGTAAGTA 900
QY 471 tgtatgtagaagtagaagtagaagtagaagtagaagtagaagtagaagtaga 530
DB 901 TTTACTGATATATGCTATGCTATGCTATGCTATGCTATGCTATGCTATGCTAT 960
QY 531 gaatcagtagaagtagaagtagaagtagaagtagaagtagaagtagaagtaga 590
DB 961 AAAGTCTATATGCTATGCTATGCTATGCTATGCTATGCTATGCTATGCTATG 1020
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DB 1021 ATTTGAGACATTTATGAGAGTCTGAGGCGAAAGAGGTA---GATTTAGTGT 1077
QY 651 atcttgatgtagaagtagaagtagaagtagaagtagaagtagaagtagaagtaga 710
DB 1078 TACTTAAATGCTATGCTATGCTATGCTATGCTATGCTATGCTATGCTATGCT 1137
QY 711 aaaaacagtagaagtagaagtagaagtagaagtagaagtagaagtagaagtaga 770
DB 1138 TAAATAAATGCTATGCTATGCTATGCTATGCTATGCTATGCTATGCTATGCT 1181
QY 771 atataaagtagaagtagaagtagaagtagaagtagaagtagaagtagaagtaga 830
DB 1182 - - - - - AAAAAAGAGCTTAAATCTTTTAAAGTGTGAATATGATGATGCCCTAA 1239
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DB 1240 ACCTGTGAGACGTCACAGACATATCTCTAAACATC 1274
RESULT 3
SPSFB LOCUS
DEFINITION S.pyogenes Sfb gene for fibronectin-binding protein (partial).
ACCESSION X67947.1
VERSION X67947.1 GI:511149
KEYWORDS fibronectin-binding protein; sfb gene.
SOURCE Streptococcus pyogenes.
ORGANISM Streptococcus pyogenes.
Bacteria; Firmicutes; Bacillus/Clostridium group; Streptococcaceae;
Streptococcus.
1 (bases 1 to 2263)
REFERENCE Talay,S.R.
AUTHORS Direct Submission
JOURNAL Submitted (31-JUL-1992) S.R. Talay, GBF, Mascheroder Weg 1, 3300
Braunschweig, FRG
REMARK revised by (4)
REFERENCE Talay,S.R., Valentini-Weigand,P., Jermstrom,P.G., Timmis,K.N. and
AUTHORS Chhatwal,G.S.
TITLE Fibronectin-binding protein of Streptococcus pyogenes: sequence of
the binding domain involved in adherence of streptococci to
epithelial cells
JOURNAL Infect. Immun. 60 (9), 3837-3844 (1992)
MEDLINE 92363585
REFERENCE Talay,S.R., Valentini-Weigand,P., Timmis,K.N. and Chhatwal,G.S.
AUTHORS Domain structure and conserved epitopes of Sfb protein, the
JOURNAL fibronectin-binding adhesin of Streptococcus pyogenes
Mol. Microbiol. 13 (3), 531-539 (1994)
MEDLINE 95089690
REFERENCE Talay,S.R.
AUTHORS 4 (bases 1 to 2263)
JOURNAL Direct Submission
TITLE Submitted (13-JUL-1994) S.R. Talay, GBF, Mascheroder Weg 1, 3300
JOURNAL Braunschweig, FRG
COMMENT On Jul 17, 1994 this sequence version replaced g1:47433.
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BASE COUNT 790 a 383 c 477 g 613 t
ORIGIN

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 Best Local Similarity 56.6%; Pred. No. 4e-20;
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QY 51 ggtattaaagtaaacacaaacgatttacttgcactttagtgaggagcttttaaatgat 110
 DB 165 GGCACACACAAAAAGAAAAAGCGATTGCTGACACTTGTAGTGGAGCTTTTATATGCT 224
 QY 111 ctccgcttggtacttccatggttggtgactgactggttttggttagtaaatcctc 170
 DB 225 TTTGGCAATCCGCGGTCGTATCGTTTGGTCAAGTACCGTATGCTCCGACGAGAAC 284
 QY 171 gaccccaaacgacataaacacagattcagaatcgaatacagatgtagatgaatc 230
 DB 285 TGTGCCCATAGAGTGTGTAAATCTCT-----GAGTTTCCTCGTATGTTATGATTT 338
 QY 231 ttatgtaagaggacatccatattataaacagtttagtagtagcagacgatttaagggttaa 290
 DB 339 CTACAAAGGACCTTACACAGATAT-----CATATTTACAGCTAAA 380
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 DB 441 GAAAGAAAGTAGTATTTTCCGAATTTGTTAAGAGGTGGATGTGATGAAGAGACATT 500
 QY 411 tgaagattatgcatagcacccctagaa-----ttacgggagata 449
 DB 501 TGTAAATATATGATATACCCCGAAAAAGATTAAGAAAGTTCCAGAGTATATAGATGAGA 560
 QY 450 gctaaacacagaattacagagctgtatgtaataagacatcccaaaaatgccaatggtat 509
 DB 561 ATTAGAAAAAATATATTAAGAGTGTATATATGATATCCGATATACCGTAAATGGAAT 620
 QY 510 tatgaaagctctggaacccctggaatgctatcagaagttacaagaagcggtatgtaacta 569
 DB 621 CATGAGAGGTTTAGAACCATTAATATGCTATCTTAGTAACCAAAATGCTGTTTGACTA 680
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 QY 690 gaatttgcacataaataatgcacaaacagatccgagatatttccaagtaagatttga 749
 DB 801 TAGGTATCTGAGAAATCATTTGAACCTGTGCCATCTACTTTTAGACTGATATATTTTGA 860
 QY 750 gtcgagacagaaggagataaatat 774
 DB 861 ATCTACAGATATAGCTATATCAAAAT 885

RESULT 4
 LOCUS 66031115 2066 bp DNA BCT 27-AUG-1996
 DEFINITION Group G streptococcus fibronectin binding protein (gfba) gene,
 complete cds.
 ACCESSION U31115
 VERSION U31115.1 GI:950168
 KEYWORDS
 ORGANISM group G streptococcus.
 Streptococcus sp. 'group G'
 Bacteria; Firmicutes; Bacillus/Clostridium group; Streptococcaceae;
 Streptococcus.
 1 (bases 1 to 2066)
 Kline,J.B., Xu,S., Bisno,A.L. and Collins,C.M.
 TITLE Identification of a fibronectin-binding protein (Gfba) in

JOURNAL pathogenic group G streptococci
 MEDLINE Infect. Immun. 64 (6), 2122-2129 (1996)
 REFERENCE 96239026
 AUTHORS 2 (bases 1 to 2066)
 Kline,J.B., Xu,S., Bisno,A.L. and Collins,C.M.
 TITLE Direct Submission
 JOURNAL Submitted (06-JUL-1995) James B. Kline, Microbiology & Immunology,
 University of Miami, 1600 NW 10th Ave, Miami, FL 33136, USA
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 BASE COUNT 724 a 326 c 435 g 581 t
 ORIGIN

Query Match 7.4%; Score 167.6; DB 2; Length 2066;
 Best Local Similarity 55.7%; Pred. No. 4.4e-18;
 Matches 398; Conservative 0; Mismatches 289; Indels 27; Gaps 3;

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 DB 381 GCGGTCCTATCGGTTTGGTCAAGTACGCTATGCTCCGATGAGAAAGACTGCGCAAT 440
 QY 181 gcaataaacagattacgaatcgaatcagatgtagatagaatctttagtaaga 240
 DB 441 TTTAAAGCCCGAGATCCA-----GATTATCCCTGGTATGCTATGCTTTTACTGGA 494
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RESULT 6

AF009914

LOCUS

DEFINITION

ACCESSION

VERSION

KEYWORDS

SOURCE

ORGANISM

AF009914

321 bp

DNA

Streptococcus pyogenes fibronectin binding protein F gene, partial cds.

AF009914

AF009914.1

GI:2267181

Streptococcus pyogenes.

Streptococcus pyogenes

BCT

13-FEB-1998


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RESULT 10
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DEFINITION Streptococcus pyogenes fibronectin binding protein F gene, partial cds.
ACCESSION AF009915
VERSION AF009915.1 GI:2267183
KEYWORDS
SOURCE Streptococcus pyogenes.
ORGANISM Streptococcus pyogenes.
REFERENCE
AUTHORS Katerov,V., Andreev,A., Schalen,C. and Totolian,A.A.
TITLE 1 (bases 1 to 309)
JOURNAL Protein F, a fibronectin-binding protein of Streptococcus pyogenes, also binds human fibrinogen: Isolation of the protein and mapping of the binding region
Microbiology 144 (Pt 1), 119-126 (1998)
98129085
MEDLINE
REFERENCE
AUTHORS Katerov,V.E., Andreev,A.S., Schalen,C. and Totolian,A.A.
TITLE Direct Submission
JOURNAL Submitted (23-JUN-1997) Medical Microbiology, Lund University, Solvegatan 23, Lund 22362, Sweden
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ORGANISM Streptococcus pyogenes
Bacteria; Firmicutes; Bacillus/Clostridium group; Streptococcaceae;
Streptococcus.
REFERENCE
AUTHORS Katerov,V., Andreev,A., Schalen,C. and Totolian,A.A.
TITLE 1 (bases 1 to 278)
JOURNAL Protein F, a fibronectin-binding protein of Streptococcus pyogenes, also binds human fibrinogen: Isolation of the protein and mapping of the binding region
Microbiology 144 (Pt 1), 119-126 (1998)
98129085
MEDLINE
REFERENCE
AUTHORS Katerov,V.E., Andreev,A.S., Schalen,C. and Totolian,A.A.
TITLE Direct Submission
JOURNAL Submitted (23-JUN-1997) Medical Microbiology, Lund University, Solvegatan 23, Lund 22362, Sweden
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DB 176 AAAAGAGCTTCTCCGCCGCACTCATGATATTACAAATAATTTTACAGAAATTTGTT 235
QY 394 ggaatcctcaaaattgaagattatgcagtagccctag 434
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RESULT 12

AC074354

LOCUS AC074354

DEFINITION 24 unordered pieces.

ACCESSION AC074354

VERSION AC074354.6 GI:11138177

KEYWORDS HTG; HTGS; PHASE1.

SOURCE Oryza sativa.

ORGANISM Oryza sativa

REFERENCE

AUTHORS McCombie,W.R.

TITLE Rice genomic sequence

JOURNAL Unpublished

REFERENCE 2 (bases 1 to 195969)

AUTHORS McCombie,W.R.

TITLE Direct Submission

JOURNAL Submitted (29-JUN-2000) Lita Annenberg Hazen Genome Center, Cold Spring Harbor Laboratories, 1, Bungtown Road, Cold Spring Harbor, NY 11724, USA

COMMENT On Nov 11, 2000 this sequence version replaced gi:11094673.

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LOCUS Streptococcus pyogenes fibronectin binding protein F gene, partial
DEFINITION cds
ACCESSION AF009909
VERSION AF009909.1 GI:2267171
KEYWORDS Streptococcus pyogenes.
SOURCE Streptococcus pyogenes.
ORGANISM Bacteria; Firmicutes; Bacillus/Clostridium group; Streptococcaceae; Streptococcus.

REFERENCE 1 (bases 1 to 281)
AUTHORS Katerov,V., Andreev,A., Schalen,C. and Totolian,A.A.
TITLE Protein F, a fibronectin-binding protein of Streptococcus pyogenes, also binds human fibrinogen: Isolation of the protein and mapping of the binding region
JOURNAL Microbiology 144 (Pt 1), 119-126 (1998)
MEDLINE 98129085
REFERENCE 2 (bases 1 to 281)
AUTHORS Katerov,V.E., Andreev,A.S., Schalen,C. and Totolian,A.A.
TITLE Direct Submission
JOURNAL Submitted (23-JUN-1997) Medical Microbiology, Lund University, Solvegatan 23, Lund 22362, Sweden
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QY 305 gaagttatacaagttatcttaattaaagaagaacattcctcgtgatacagatga 364

Db 147 AGGAGATCAACGATATGTTTAACTTAACAAATAATTAATTTCTGCCCCACTTATAGTA 206
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QY 425 tgagccctagaatt 438
Db 267 CGAATCTAGGGTT 280

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LOCUS Streptococcus pyogenes fibronectin binding protein F gene, partial
DEFINITION cds
ACCESSION AF009912
VERSION AF009912.1 GI:2267177
KEYWORDS Streptococcus pyogenes.
SOURCE Streptococcus pyogenes.
ORGANISM Bacteria; Firmicutes; Bacillus/Clostridium group; Streptococcaceae; Streptococcus.

REFERENCE 1 (bases 1 to 282)
AUTHORS Katerov,V., Andreev,A., Schalen,C. and Totolian,A.A.
TITLE Protein F, a fibronectin-binding protein of Streptococcus pyogenes, also binds human fibrinogen: Isolation of the protein and mapping of the binding region
JOURNAL Microbiology 144 (Pt 1), 119-126 (1998)
MEDLINE 98129085
REFERENCE 2 (bases 1 to 282)
AUTHORS Katerov,V.E., Andreev,A.S., Schalen,C. and Totolian,A.A.
TITLE Direct Submission
JOURNAL Submitted (23-JUN-1997) Medical Microbiology, Lund University, Solvegatan 23, Lund 22362, Sweden
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